

1. An eight-wheel transit vehicle having a rigid underframe comprises:

a centrally pivoted four wheel center-line electrified guide-beam follower at each end thereof which steers as a group four load-bearing wheels mounted on four center underframe-pivoted axle arms under each end of the transit vehicle,

5 a magnetic linear motor suspended between each pair of wheels by two locating arms pivoted from their adjacent axle arms and imposing the motor weight and thrust on an interaxle support beam attached under the axle arms thereby transferring the magnetic linear motor induced acceleration force from the axle arms through diagonal rods to the vehicle underframe to cause vehicle travel along a rollway.

10 2. The propulsion system of claim 1 whereby an air-gap clearance between each linear motor and the rollway surface is computer measured and mechanically adjusted and continually computer maintained by collared jackscrews mounted on the locating arms above the interaxle support beam.

15 3. The propulsion system of claim 1 the rollway comprises a central electrified guide-beam in combination with and between two widely spaced rollway surfaces that provide an electromagnetic secondary for the magnetic linear motors electromagnetically induced varying vertical and directional forces concomitantly increasing the total weight-carrying function of the
20 four rolling wheels at each end of the vehicle.

4. The propulsion system of claim 1 wherein positive displacement air compression is forced through created interstices and channels in the insulated coil-windings and the laminations of the linear motors for heat rejection, then exhausting to decrease dirt and debris on the rollway surfaces.